Monthly observations of the magnetical and meteorological instruments for August; also two absolute determinations of the horizontal intensity, taken in January and April 1841.

Monthly and term-day observations for May, June and July 1841.

Magnetic dip and intensity taken at Johanna, Madras and Singapore.

3. The Magnetic Observatory at Simla.

Magnetic and meteorological observations for January, February, March and April 1841; also transcripts of sheets D. for January, February and March 1841, to be substituted for similar sheets for those months.

Preliminary observations regarding the Magnetic Observatory at Simla for May 1841.

Observations for June 1841, including term-day curves; also a general abstract of the mean readings of the instruments.

Magnetic term observations for July and August 1841, made at the Magnetic Observatory, Simla.

4. "Variations de la déclinaison et intensité horizontale magnétique observées à Milan, pendant 24 heures de suite, le 28 et 27 Novembre 1841." Par Signor Carlini, For. Memb. R.S.

5. "On a Calculating Machine." By the Rev. Henry Moseley, M.A., F.R.S., Professor of Natural Philosophy and Astronomy in King's College.

The object which the author proposes to accomplish in the construction of this machine, is to determine mechanically the products, quotients, logarithms, squares, and other powers of the natural numbers, by means of combinations of greater simplicity than have hitherto been applied to the purposes of mechanical calculation. The paper is accompanied by a figure illustrating the principle of the machine, but not representing the mechanical details of its construction. An outline is then given of the essential parts of the instrument, and of the theory of their operation.

6. A paper was also in part read entitled, "On Fibre." By Martin Barry, M.D., F.R.SS. Lond. and Edin.

January 6, 1842.

LIEUT.-COLONEL WM. HENRY SYKES, V.P., in the Chair.

Lieut. Thomas John Newbold was balloted for, and duly elected a Fellow of the Society.

The reading of a paper entitled, "On Fibre," by Martin Barry, M.D., F.R.SS. Lond. and Edin., was resumed and concluded.

The author observes, that, in the mature blood-corpuscle, there is